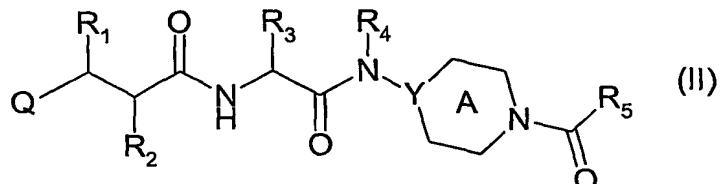


## Claims:

1. A compound of formula (II), or a pharmaceutically or veterinarily acceptable salt, hydrate or solvate thereof



wherein

Q represents a radical of formula -N(OH)CH(=O) or formula -C(=O)NH(OH);

R<sub>1</sub> represents hydrogen, methyl or trifluoromethyl, or, except when Z is a radical of formula -N(OH)CH(=O), a hydroxy, halo or amino group;

R<sub>2</sub> represents a group R<sub>10</sub>-(V)<sub>n</sub>-(ALK)<sub>m</sub>- wherein

R<sub>10</sub> represents hydrogen, or a C<sub>1</sub>-C<sub>6</sub> alkyl, C<sub>2</sub>-C<sub>6</sub> alkenyl, C<sub>2</sub>-C<sub>6</sub> alkynyl, cycloalkyl, aryl, or heterocyclyl group, any of which may be unsubstituted or substituted by (C<sub>1</sub>-C<sub>6</sub>)alkyl, (C<sub>1</sub>-C<sub>6</sub>)alkoxy, hydroxy, mercapto, (C<sub>1</sub>-C<sub>6</sub>)alkylthio, amino, halo (including fluoro, chloro, bromo and iodo), trifluoromethyl, cyano, nitro, oxo, -COOH, -CONH<sub>2</sub>, -COOR<sup>A</sup>, -NHCOR<sup>A</sup>, -CONHR<sup>A</sup>, -NHR<sup>A</sup>, -NR<sup>A</sup>R<sup>B</sup>, or -CONR<sup>A</sup>R<sup>B</sup> wherein R<sup>A</sup> and R<sup>B</sup> are independently a (C<sub>1</sub>-C<sub>6</sub>)alkyl group and

ALK represents a straight or branched divalent C<sub>1</sub>-C<sub>6</sub> alkylene, C<sub>2</sub>-C<sub>6</sub> alkenylene, or C<sub>2</sub>-C<sub>6</sub> alkynylene radical, and may be interrupted by one or more non-adjacent -NH-, -O- or -S- linkages,

V represents -NH-, -O- or -S-, and

m and n are independently 0 or 1;

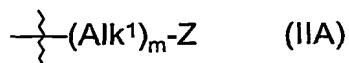
R<sub>3</sub> represents the side chain of a natural or non-natural alpha amino acid;

R<sub>4</sub> represents hydrogen or C<sub>1</sub>-C<sub>3</sub> alkyl;

Y represents N or CH;

ring A is optionally substituted on one or more ring carbon atoms by C<sub>1</sub>-C<sub>3</sub> alkyl, C<sub>1</sub>-C<sub>3</sub> alkoxy, or halo; and

R<sub>5</sub> represents a group (IIA),



wherein

m is 0 or 1;

Alk<sup>1</sup> represents a divalent C<sub>1</sub>-C<sub>3</sub> alkylene radical;

Z represents hydrogen or cycloalkyl, phenyl or heterocyclic which is optionally substituted by

(C<sub>1</sub>-C<sub>6</sub>)alkyl,

phenyl

monocyclic 5 or 6-membered heterocyclic,

benzyl,

phenoxy, or (C<sub>1</sub>-C<sub>6</sub>)alkoxy,

phenylthio or (C<sub>1</sub>-C<sub>6</sub>)alkylthio, any of which is in turn optionally substituted by:

hydroxy or mercapto,

trifluoromethyl,

oxo,

nitro,

cyano (-CN)

bromo, chloro, fluoro, or iodo

-COOH, or -COOR<sup>A</sup>,

-CONH<sub>2</sub>, -CONHR<sup>A</sup>, or -CONR<sup>A</sup>R<sup>B</sup>

-COR<sup>A</sup>, -SO<sub>2</sub>R<sup>A</sup>,

-NHCOR<sup>A</sup>,

-NH<sub>2</sub>, -NHR<sup>A</sup>, or -NR<sup>A</sup>R<sup>B</sup>,

wherein R<sup>A</sup> and R<sup>B</sup> are independently a (C<sub>1</sub>-C<sub>6</sub>) alkyl group, or R<sup>A</sup> and R<sup>B</sup> taken together with the nitrogen atom to which they are attached form a 5- or 6-membered heterocyclic ring which may besubstituted by (C<sub>1</sub>C<sub>3</sub>)alkyl, hydroxy, or hydroxy(C<sub>1</sub>-C<sub>3</sub>)alkyl.

2. A compound as claimed in claim 1 wherein Z represents cycloalkyl, phenyl or monocyclic-heterocyclic, which is optionally substituted by

(C<sub>1</sub>-C<sub>6</sub>)alkyl, (C<sub>2</sub>-C<sub>6</sub>)alkenyl, or (C<sub>2</sub>-C<sub>6</sub>)alkynyl,

phenyl, or halophenyl,

trifluoromethyl,

monocyclic 5 or 6-membered hetrocyclic,

benzyl, or halophenylmethyl,

hydroxy, phenoxy, (C<sub>1</sub>-C<sub>6</sub>)alkoxy, or hydroxy(C<sub>1</sub>-C<sub>6</sub>)alkyl,

mercapto, (C<sub>1</sub>-C<sub>6</sub>)alkylthio or mercapto(C<sub>1</sub>-C<sub>6</sub>)alkyl,

oxo,

nitro,

cyano (-CN)

bromo, chloro, fluoro, or iodo

-COOH, or -COOR<sup>A</sup>,

-CONH<sub>2</sub>, -CONHR<sup>A</sup>, or -CONR<sup>A</sup>R<sup>B</sup>

-COR<sup>A</sup>, -SO<sub>2</sub>R<sup>A</sup>,

-NHCOR<sup>A</sup>,

-NH<sub>2</sub>, -NHR<sup>A</sup>, or -NR<sup>A</sup>R<sup>B</sup>,

wherein R<sup>A</sup> and R<sup>B</sup> are independently a (C<sub>1</sub>-C<sub>6</sub>) alkyl group, or R<sup>A</sup> and R<sup>B</sup> taken together with the nitrogen atom to which they are attached form a 5- or 6-membered heterocyclic ring which may be substituted by (C<sub>1</sub>C<sub>3</sub>)alkyl, hydroxy, or hydroxy(C<sub>1</sub>-C<sub>3</sub>)alkyl.

3. A compound as claimed in claim 1 or claim 2 wherein R<sub>1</sub> is hydrogen.
4. A compound as claimed in any of the preceding claims wherein R<sub>2</sub> is (C<sub>1</sub>-C<sub>6</sub>)alkyl-, cycloalkyl(C<sub>1</sub>-C<sub>6</sub>)alkyl-, (C<sub>1</sub>-C<sub>3</sub>)alkyl-S-(C<sub>1</sub>-C<sub>3</sub>)alkyl-, or (C<sub>1</sub>-C<sub>3</sub>)alkyl-O-(C<sub>1</sub>-C<sub>3</sub>)alkyl-.
5. A compound as claimed in any of claims 1 to 3 wherein R<sub>2</sub> is n-propyl, n-butyl, n-pentyl, cyclopentylmethyl, cyclopentylethyl, cyclohexylmethyl or cyclohexylethyl.
6. A compound as claimed in any of the preceding claims wherein R<sub>3</sub> is the characterising group of a natural  $\alpha$  amino acid, for example benzyl, or 4-methoxyphenylmethyl, in which any functional group may be protected, any amino group may be acylated and any carboxyl group present may be amidated; or  
a group -[Alk]<sub>n</sub>R<sub>9</sub> where Alk is a (C<sub>1</sub>-C<sub>6</sub>)alkylene or (C<sub>2</sub>-C<sub>6</sub>)alkenylene group optionally interrupted by one or more -O-, or -S- atoms or -N(R<sub>12</sub>)- groups [where R<sub>12</sub> is a hydrogen atom or a (C<sub>1</sub>-C<sub>6</sub>)alkyl group], n is 0 or 1, and R<sub>9</sub> is hydrogen or an optionally substituted phenyl, aryl, heterocyclyl, cycloalkyl or cycloalkenyl group or (only when n is 1) R<sub>9</sub> may additionally be hydroxy, mercapto, (C<sub>1</sub>-C<sub>6</sub>)alkylthio, amino, halo, trifluoromethyl, nitro, -COOH, -

$\text{CONH}_2$ -COOR<sup>A</sup>, -NHCOR<sup>A</sup>, -CONHR<sup>A</sup>, -NHR<sup>A</sup>, -NR<sup>A</sup>R<sup>B</sup>, or -CONR<sup>A</sup>R<sup>B</sup>

wherein R<sup>A</sup> and R<sup>B</sup> are independently a (C<sub>1</sub>-C<sub>6</sub>)alkyl group; or

a benzyl group substituted in the phenyl ring by a group of formula -

OCH<sub>2</sub>COR<sub>8</sub> where R<sub>8</sub> is hydroxyl, amino, (C<sub>1</sub>-C<sub>6</sub>)alkoxy, phenyl(C<sub>1</sub>-C<sub>6</sub>)alkoxy, (C<sub>1</sub>-C<sub>6</sub>)alkylamino, di((C<sub>1</sub>-C<sub>6</sub>)alkyl)amino, phenyl(C<sub>1</sub>-C<sub>6</sub>)alkylamino; or

a heterocyclic(C<sub>1</sub>-C<sub>6</sub>)alkyl group, either being unsubstituted or mono- or di-substituted in the heterocyclic ring with halo, nitro, carboxy, (C<sub>1</sub>-C<sub>6</sub>)alkoxy, cyano, (C<sub>1</sub>-C<sub>6</sub>)alkanoyl, trifluoromethyl (C<sub>1</sub>-C<sub>6</sub>)alkyl, hydroxy, formyl, amino, (C<sub>1</sub>-C<sub>6</sub>)alkylamino, di-(C<sub>1</sub>-C<sub>6</sub>)alkylamino, mercapto, (C<sub>1</sub>-C<sub>6</sub>)alkylthio, hydroxy(C<sub>1</sub>-C<sub>6</sub>)alkyl, mercapto(C<sub>1</sub>-C<sub>6</sub>)alkyl or (C<sub>1</sub>-C<sub>6</sub>)alkylphenylmethyl; or

a group -CR<sub>a</sub>R<sub>b</sub>R<sub>c</sub> in which:

each of R<sub>a</sub>, R<sub>b</sub> and R<sub>c</sub> is independently hydrogen, (C<sub>1</sub>-C<sub>6</sub>)alkyl, (C<sub>2</sub>-C<sub>6</sub>)alkenyl, (C<sub>2</sub>-C<sub>6</sub>)alkynyl, phenyl(C<sub>1</sub>-C<sub>6</sub>)alkyl, (C<sub>3</sub>-C<sub>8</sub>)cycloalkyl; or

R<sub>c</sub> is hydrogen and R<sub>a</sub> and R<sub>b</sub> are independently phenyl or heteroaryl such as pyridyl; or

R<sub>c</sub> is hydrogen, (C<sub>1</sub>-C<sub>6</sub>)alkyl, (C<sub>2</sub>-C<sub>6</sub>)alkenyl, (C<sub>2</sub>-C<sub>6</sub>)alkynyl, phenyl(C<sub>1</sub>-C<sub>6</sub>)alkyl, or (C<sub>3</sub>-C<sub>8</sub>)cycloalkyl, and R<sub>a</sub> and R<sub>b</sub> together with the carbon atom to which they are attached form a 3 to 8 membered cycloalkyl or a 5- to 6-membered heterocyclic ring; or

R<sub>a</sub>, R<sub>b</sub> and R<sub>c</sub> together with the carbon atom to which they are attached form a tricyclic ring (for example adamantyl); or

R<sub>a</sub> and R<sub>b</sub> are each independently (C<sub>1</sub>-C<sub>6</sub>)alkyl, (C<sub>2</sub>-C<sub>6</sub>)alkenyl, (C<sub>2</sub>-C<sub>6</sub>)alkynyl, phenyl(C<sub>1</sub>-C<sub>6</sub>)alkyl, or a group as defined for R<sub>c</sub> below other than hydrogen, or R<sub>a</sub> and R<sub>b</sub> together with the carbon atom to which

they are attached form a cycloalkyl or heterocyclic ring, and R<sub>c</sub> is hydrogen, -OH, -SH, halogen, -CN, -CO<sub>2</sub>H, (C<sub>1</sub>-C<sub>4</sub>)perfluoroalkyl, -CH<sub>2</sub>OH, -CO<sub>2</sub>(C<sub>1</sub>-C<sub>6</sub>)alkyl, -O(C<sub>1</sub>-C<sub>6</sub>)alkyl, -O(C<sub>2</sub>-C<sub>6</sub>)alkenyl, -S(C<sub>1</sub>-C<sub>6</sub>)alkyl, -SO(C<sub>1</sub>-C<sub>6</sub>)alkyl, -SO<sub>2</sub>(C<sub>1</sub>-C<sub>6</sub>)alkyl, -S(C<sub>2</sub>-C<sub>6</sub>)alkenyl, -SO(C<sub>2</sub>-C<sub>6</sub>)alkenyl, -SO<sub>2</sub>(C<sub>2</sub>-C<sub>6</sub>)alkenyl or a group -Q-W wherein Q represents a bond or -O-, -S-, -SO- or -SO<sub>2</sub>- and W represents a phenyl, phenylalkyl, (C<sub>3</sub>-C<sub>8</sub>)cycloalkyl, (C<sub>3</sub>-C<sub>8</sub>)cycloalkylalkyl, (C<sub>4</sub>-C<sub>8</sub>)cycloalkenyl, (C<sub>4</sub>-C<sub>8</sub>)cycloalkenylalkyl, heteroaryl or heteroarylalkyl group, which group W may optionally be substituted by one or more substituents independently selected from, hydroxyl, halogen, -CN, -CO<sub>2</sub>H, -CO<sub>2</sub>(C<sub>1</sub>-C<sub>6</sub>)alkyl, -CONH<sub>2</sub>, -CONH(C<sub>1</sub>-C<sub>6</sub>)alkyl, -CONH(C<sub>1</sub>-C<sub>6</sub>)alkyl<sub>2</sub>, -CHO, -CH<sub>2</sub>OH, (C<sub>1</sub>-C<sub>4</sub>)perfluoroalkyl, -O(C<sub>1</sub>-C<sub>6</sub>)alkyl, -S(C<sub>1</sub>-C<sub>6</sub>)alkyl, -SO(C<sub>1</sub>-C<sub>6</sub>)alkyl, -SO<sub>2</sub>(C<sub>1</sub>-C<sub>6</sub>)alkyl, -NO<sub>2</sub>, -NH<sub>2</sub>, -NH(C<sub>1</sub>-C<sub>6</sub>)alkyl, -N((C<sub>1</sub>-C<sub>6</sub>)alkyl)<sub>2</sub>, -NHCO(C<sub>1</sub>-C<sub>6</sub>)alkyl, (C<sub>1</sub>-C<sub>6</sub>)alkyl, (C<sub>2</sub>-C<sub>6</sub>)alkenyl, (C<sub>2</sub>-C<sub>6</sub>)alkynyl, (C<sub>3</sub>-C<sub>8</sub>)cycloalkyl, (C<sub>4</sub>-C<sub>8</sub>)cycloalkenyl, phenyl or benzyl.

7. A compound as claimed in any of claims 1 to 6 wherein R<sub>3</sub> is methyl, ethyl, n-propyl, n-butyl, benzyl, 4-chlorobenzyl, 4-hydroxybenzyl, phenyl, cyclohexyl, cyclohexylmethyl, pyridin-3-ylmethyl, tert-butoxymethyl, naphthylmethyl, iso-butyl, sec-butyl, tert-butyl, 1-benzylthio-1-methylethyl, 1-methylthio-1-methylethyl, 1-mercaptop-1-methylethyl, 1-methoxy-1-methylethyl, 1-hydroxy-1-methylethyl, 1-fluoro-1-methylethyl, hydroxymethyl, 2-hydroxethyl, 2-carboxyethyl, 2-methylcarbamoylethyl, 2-carbamoylethyl, or 4-aminobutyl.

8. A compound as claimed in any of claims 1 to 6 wherein R<sub>3</sub> is tert-butyl, iso-butyl, benzyl, isopropyl or methyl.

9. A compound as claimed in any of the preceding claims wherein R<sub>4</sub> is methyl.

10. A compound, method, use or composition as claimed in any of the preceding claims wherein in the group R<sub>5</sub>, m is 1, and Alk<sup>1</sup> is -(CH<sub>2</sub>)- or -(CH<sub>2</sub>CH<sub>2</sub>)-.

11. A compound as claimed in any of the preceding claims wherein, in the group R<sub>5</sub>, Z is a phenyl, pyridyl, thienyl, furanyl, pyranyl, pyrolyl, diazolyl, triazolyl, thiazolyl, thiadiazolyl, oxazolyl, ozadiazolyl, indolyl, benzisozazolyl, benzthiazolyl or imidazothiazolyl ring, optionally substituted as specified in claim 1 of claim 2.

12. A compound as claimed in claim 11 wherein the ring Z is unsubstituted or substituted by methyl, methoxy, ethoxy, methoxymethyl, ethylthio, chloro, bromo, hydroxy, nitro, phenyl, 2- or 4-nitrophenyl, dimethylamino, dimethylaminophenyl, methylsulphonyl, dimethylaminosulphonyl, 3-pyridyl or 2-pyrazin-2-yl.

12. A compound as claimed in any of claims 1 to 10 wherein, in the group R<sub>5</sub>, Z is a cyclopentyl, cyclohexyl, phenyl, morpholinyl, pyrimidin-2-yl, 1,2,3-thiadiazol-5-yl, 1,4-thiazol-5-yl, benzofuran-2-yl, 2- or 3-furanyl, 2- or 3-thienyl, 2- or 3-pyranyl, 2-, 3- or 4-pyrrolyl, 3-, 4- or 5-pyrazolyl, 3-, 4- or 5-isoxazolyl, or 2-, 3- or 4-pyridyl ring any of which may optionally be substituted by hydroxy, methoxy, ethoxy, mercapto, methylthio, ethylthio, methyl, ethyl, trifluoromethyl, fluoro, chloro, amino, methylamino, or dimethylamino.

13. A compound as claimed in claim 1 or claim 2 wherein the compound is one specifically named and/or exemplified herein, or is the hydroxamate (Q represents a radical of formula -C(=O)NH(OH)) analogue thereof.

14. A method for the treatment of bacterial infections in humans and non-human mammals, which comprises administering to a subject suffering such infection an antibacterially effective dose of a compound as claimed in any of claims 1 to 13.

15. A method for the treatment of bacterial contamination by applying an antibacterially effective amount of a compound as claimed in any of claims 1 to 13 to the site of contamination.

16. The use of a compound as claimed in any of claims 1 to 13 in the manufacture of an antibacterial composition.

17. A pharmaceutical or veterinary composition comprising a compound as claimed in any of claims 1 to 13 together with a pharmaceutically or veterinarily acceptable carrier.